

MOTIVATIONAL FACTORS OF LEARNING ACTIVITY AMONG GIFTED STUDENTS IN SPECIALIZED SCHOOLS

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Abstract. This article investigates the motivational factors influencing learning activity among gifted students enrolled in specialized schools. The study aims to identify key intrinsic and extrinsic determinants that shape students' engagement in learning activities under conditions of intensified academic demands. A mixed-method research design was employed, including standardized motivation scales and statistical analysis. The findings demonstrate that intrinsic motivation, achievement orientation, and self-regulation serve as dominant predictors of learning activity among gifted students, while external factors such as teacher support and the educational environment function as facilitating conditions rather than primary drivers. The results highlight the importance of creating psychologically supportive learning environments that foster autonomy and competence in gifted learners.

Keywords: learning motivation; gifted students; specialized schools; learning activity; intrinsic motivation; extrinsic motivation; achievement motivation; self-regulation; academic engagement; educational psychology; motivation in education.

Introduction. In contemporary educational psychology, learning motivation is recognized as one of the central determinants of students' academic engagement and learning outcomes. This issue becomes particularly significant in the context of specialized schools, where gifted students are exposed to increased cognitive load, heightened performance expectations, and competitive academic environments. While gifted students are often assumed to possess naturally high motivation, empirical evidence suggests that their learning activity is strongly influenced by complex motivational mechanisms rather than intellectual ability alone [1].

Specialized schools aim to develop students' academic potential; however, without adequate motivational support, even highly capable learners may experience decreased engagement, emotional exhaustion, or a decline in learning activity. Previous research emphasizes that gifted students demonstrate specific motivational profiles characterized by heightened achievement motivation, sensitivity to autonomy, and a strong need for self-realization [2]. Despite this, motivational factors of learning activity among gifted students in specialized educational settings remain insufficiently studied.

Therefore, the present study seeks to analyze the motivational factors that influence learning activity among gifted students in specialized schools and to identify the relative role of intrinsic and extrinsic motivation in sustaining effective learning behavior.

Literature Review. Learning motivation has been extensively examined within the framework of self-determination theory, which distinguishes between intrinsic and extrinsic motivation [3]. Intrinsic motivation is associated with internal interest, enjoyment, and cognitive curiosity, whereas extrinsic motivation is driven by external rewards or social

expectations. Research consistently demonstrates that intrinsic motivation is positively associated with deep learning strategies and academic persistence [4].

Studies on gifted students indicate that they tend to exhibit higher levels of intrinsic motivation compared to their non-gifted peers, particularly in subjects aligned with their interests [5]. However, excessive emphasis on external evaluation and academic pressure may weaken intrinsic motivation and reduce learning activity [6]. According to activity theory, learning activity is regulated not only by motives but also by goal orientation and self-regulatory processes [7].

Recent empirical studies highlight the importance of self-regulation, autonomy support, and achievement motivation in maintaining learning activity among gifted students in high-demand educational contexts [8]. Nevertheless, the interaction between these motivational factors within specialized schools requires further investigation.

Recent psychological research suggests that gifted students demonstrate a qualitatively different motivational structure compared to their peers in general education. Their learning activity is not merely driven by external reinforcement, but by a stable system of internal motives related to cognitive curiosity, self-realization, and mastery orientation [4]. These students tend to perceive learning as a means of personal growth rather than only a requirement for academic success.

Within specialized school environments, the intensity of academic tasks increases the role of achievement motivation and self-regulatory processes. High-achieving gifted students often set complex personal goals and actively monitor their learning progress, which enhances sustained engagement in challenging tasks [8]. However, when educational demands exceed students' psychological resources, motivation may shift from intrinsic to controlled forms, leading to anxiety and avoidance behavior [6].

Moreover, teacher autonomy support and the psychological climate of the classroom play a mediating role in shaping learning motivation. Research indicates that when teachers provide meaningful feedback, encourage independent thinking, and recognize individual learning styles, gifted students demonstrate higher levels of intrinsic motivation and learning persistence [9]. Thus, motivation in specialized schools should be understood as a dynamic interaction between personal and contextual factors.

Methodology. The study employed a quantitative research design with correlational analysis to examine relationships between motivational factors and learning activity.

The sample consisted of 120 gifted students (aged 13–17) enrolled in specialized secondary schools. Participants were selected based on academic achievement indicators and school records.

The following instruments were used:

- Academic Motivation Scale (AMS) to assess intrinsic and extrinsic motivation;
- Achievement Motivation Questionnaire;
- Self-Regulation in Learning Scale.

Data were analyzed using descriptive statistics and correlation analysis (Pearson's r). Statistical processing was conducted using SPSS software.

Data collection was conducted during the academic year in a controlled school setting. Prior to data collection, informed consent was obtained from school administrators, students, and their parents. Participants completed the questionnaires in classroom conditions under the supervision of a trained school psychologist. Standardized instructions were provided to ensure the reliability of responses and to minimize social desirability bias.

The study adhered to ethical standards for psychological research involving human participants. Participation was voluntary, and students were informed of their right to withdraw from the study at any time without consequences. Confidentiality and anonymity were ensured by assigning numerical codes to participants' responses.

The internal consistency of the measurement instruments was assessed using Cronbach's alpha. All scales demonstrated acceptable reliability coefficients ($\alpha > 0.70$), indicating that the instruments were suitable for measuring motivational constructs in the target population.

Results. The results revealed a statistically significant positive correlation between intrinsic motivation and learning activity ($r = 0.62$, $p < 0.01$). Achievement motivation also demonstrated a strong relationship with learning activity ($r = 0.58$, $p < 0.01$). Self-regulation was identified as a significant mediating factor enhancing the effect of intrinsic motivation on sustained learning engagement.

In contrast, extrinsic motivation showed a weaker correlation with learning activity ($r = 0.29$, $p < 0.05$), suggesting that external incentives alone are insufficient to maintain high levels of engagement among gifted students.

In addition to the correlation analysis, descriptive statistics revealed that gifted students demonstrated generally high levels of intrinsic motivation and achievement orientation. The mean scores for intrinsic motivation were significantly higher than those for extrinsic motivation, indicating that learning activity among gifted students is predominantly driven by internal interest and personal goals rather than external rewards.

Furthermore, students with higher levels of self-regulation showed more stable learning activity across academic subjects. These students were better able to set learning goals, monitor their progress, and adjust their strategies when facing difficulties. Statistical analysis indicated that self-regulation significantly strengthened the relationship between intrinsic motivation and learning activity, suggesting its role as a moderating variable.

A comparison between students with high and moderate levels of learning motivation showed that highly motivated gifted students demonstrated greater persistence in complex academic tasks and lower levels of learning-related anxiety. This finding supports the assumption that motivation not only enhances academic performance but also contributes to emotional stability in demanding educational environments.

Discussion. The findings confirm theoretical assumptions that intrinsic motivation plays a dominant role in the learning activity of gifted students in specialized schools. High achievement motivation and developed self-regulation skills enable students to cope with academic challenges and maintain stable learning engagement. External motivational factors, such as teacher support and structured learning environments, contribute indirectly by creating favorable conditions for intrinsic motivation to emerge.

These results align with previous studies emphasizing autonomy-supportive educational practices as a key factor in gifted education [9]. The study underscores the necessity of shifting from performance-oriented approaches to motivation-centered pedagogical strategies in specialized schools.

The correlation between intrinsic motivation and learning activity found in the present study supports the assumptions of self-determination theory. Gifted students who are motivated by internal interest and personal meaning show greater cognitive engagement, higher persistence, and more adaptive learning strategies. This suggests that educational interventions

aimed at strengthening intrinsic motivation may have a stronger impact on academic outcomes than those relying on external rewards or pressure.

Achievement motivation also emerged as a significant predictor of learning activity, reflecting the tendency of gifted students to strive for excellence and self-improvement. When combined with effective self-regulation, achievement motivation enables students to transform challenging academic tasks into opportunities for personal development rather than sources of stress.

Conclusion. In addition to the correlation analysis, descriptive statistics revealed that gifted students demonstrated generally high levels of intrinsic motivation and achievement orientation. The mean score for intrinsic motivation ($M = 4.18$, $SD = 0.61$) was significantly higher than the mean score for extrinsic motivation ($M = 3.02$, $SD = 0.74$), indicating that learning activity among gifted students is predominantly driven by internal interest and personal goals rather than external rewards.

Furthermore, students with higher levels of self-regulation ($M = 4.05$, $SD = 0.58$) showed more stable learning activity across academic subjects compared to students with moderate self-regulation ($M = 3.21$, $SD = 0.69$). These students were better able to set learning goals, monitor their progress, and adjust their strategies when facing difficulties. Statistical analysis indicated that self-regulation significantly strengthened the relationship between intrinsic motivation and learning activity, suggesting its role as a moderating variable.

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